



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/518,378	02/08/2005	Geir Jensen	04247	8964
23338 7590 03/20/2007 DENNISON, SCHULTZ & MACDONALD 1727 KING STREET SUITE 105 ALEXANDRIA, VA 22314			EXAMINER FONSECA, JESSIE T	
			ART UNIT 3637	PAPER NUMBER
SHORTENED STATUTORY PERIOD OF RESPONSE		MAIL DATE	DELIVERY MODE	
3 MONTHS		03/20/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary

Application No.

10/518,378

Applicant(s)

JENSEN, GEIR

Examiner

Jessie Fonseca

Art Unit

3637

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-7 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-7 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. ____. |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date ____. | 6) <input type="checkbox"/> Other: ____. |

DETAILED ACTION

Claims 1-7 have been examined.

Drawings

The drawings are objected to because it appears that in fig. 2, reference character 12 is directed to the center of the fire blocking device. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they do not include the following reference sign(s) mentioned in the

Art Unit: 3637

description: 18 (line 10 of page 6). Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Specification

The abstract of the disclosure is objected to because it appears in line 1 of the abstract, "transfer" was incorrectly misspelled as "transfert". In addition, it appears "curtains" was incorrectly misspelled as "curtanis" in line 3 of the abstract. Correction is required. See MPEP § 608.01(b).

The abstract of the disclosure does not commence on a separate sheet in accordance with 37 CFR 1.52(b)(4). A new abstract of the disclosure is required and must be presented on a separate sheet, apart from any other text.

The disclosure is objected to because of the following informalities:

Line 2 of page 3: "without" was incorrectly misspelled as "whithout".

Lines 13-14 of page 4: It appears "polyethylene" was incorrectly misspelled as "polyethylen".

Appropriate correction is required.

Claim Rejections - 35 USC § 112

The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 1-7 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

With regards to claim 1: The limitation "at least one permeable flame blocking and heat absorbing and heat accumulating grille body" lacks support in the disclosure. The applicant discloses an upper mesh in the specification (line 21 of pg. 4), but there is "no mention of a "permeable flame blocking and heat absorbing and heat accumulating grille body". Applicant should be consistent.

The limitation "at least one permeable element" lacks support in the disclosure. The applicant discloses a lower grille plate in the specification (line 12 of pg. 4), but there is no mention of a "permeable element". Applicant should be consistent.

There's no support in the specification for the grille body stopping flames during instant and constant flame impact in the initial phase of flame impact. There's no disclosure, either written or shown, to support the claimed recitation.

There's no support in the specification for the at least one permeable body being the last phase of the flame impact period. There's no disclosure, either written or shown, to support the claimed recitation.

With regards to claim 3: There's no support in the specification for a cylindrical fireblocking device. There's no disclosure, either written or shown, to support the claimed recitation.

With regards to claim 4: Disclosure is not understood. It's unclear how the heat absorbing and heat storing body is formed and how that structure can be, as it is not shown or described.

With regards to claim 5: Disclosure is not understood. It's unclear how the heat absorbing and heat storing body is formed and how that structure can be, as it is not shown or described. In addition, the limitation "thermal break" lacks support in the disclosure.

With regards to claim 7: There's no support in the specification for sheet material. There's no disclosure, either written or shown, to support the claimed recitation.

Claims 2-6 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 2 recites the limitation "heat absorbing and heat storing body" in line 2 of the claim. There is insufficient antecedent basis for this limitation in the claim.

Claim 4 recites the limitation "heat absorbing and heat storing body" in line 2 of the claim. There is insufficient antecedent basis for this limitation in the claim.

Claim 5 recites the limitation "heat absorbing and heat storing body" in line 2 of the claim. There is insufficient antecedent basis for this limitation in the claim.

Claim 6 recites the limitation "heat absorbing storing perforated body" in lines 1-2 of the claim. There is insufficient antecedent basis for this limitation in the claim.

Claim 6 recites the limitation "semi-open element" in line 2 of the claim. There is insufficient antecedent basis for this limitation in the claim.

Claim 6 recites the limitation "flame front" in line 4 of the claim. There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

As best understood, claims 1-3 and 6-7 are rejected under 35 U.S.C. 102(b) as being anticipated by Baltazar (US 5,750,927)

With regards to claim 1: Baltazar discloses a fireblocking device for continuously preventing in a flame impact period the transfer of flames through ventilating apertures or similar passages, characterized by:

- at least one permeable flame blocking and heat absorbing and heat accumulating grille body (14) to stop flames during instant and constant flame impact in the initial phase of flame impact (col. 6, lines 20-24; col. 6, lines 63-67), and
- at least one permeable element (10) containing and/or incorporating an intumescent material (28), for permanent fire stopping the last phase of the flame impact period (fig. 3B; col. 7, lines 5-10).

With regards to claim 2: Baltazar further discloses a heat absorbing storing body (14) that is three-dimensional (fig. 1 and 3B).

With regards to claim 3: Baltazar further discloses it is shaped like a cylinder (fig.1).

With regards to claim 6: Baltazar further disclose the heat absorbing perforated body (14) is positioned downstream of the semi-open element (10), and which contains intumescent material (28), positioned towards the flame front (fig. 3b; col. 7, lines 5-10)..

With regards to claim 7: Baltazar further disclose that is provided as sheet material (fig. 3b).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

As best understood, claims 4-5 are rejected under 35 U.S.C. 103(a) as being unpatentable over Baltazar (US 5,750,927) in view of Anderberg (US 3,976,825).

With regards to claim 4: Baltazar fails to disclose the heat absorbing and heat storing body can contain metal pipes filled with liquid, minerals or mixes of these minerals as main element. However, Anderberg discloses pipes passing through lead-throughs, which are resistant to heat (col. 1, lines 23-26; col. 2, lines 9-15). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the fireblocking device of Baltazar to have the heat absorbing and heat storing body contain metal pipes instead of cables as taught by Anderberg in order to protect the pipes in the event of a fire.

With regards to claim 5: Baltazar fails to disclose the heat absorbing and heat storing body (14) comprises a honey comb-patterned sheet-metal, which can be arranged into a frame and includes a thermal break. However, Anderber discloses honey-comb-patterned sheet metal (Anderberg- fig.1, col. 3, line 66 – col.4, line 4), which can be arranged in the frame (3a, 3b, 3c, 3d), which includes a thermal break (col. 2, lines 9-12; col. 2, lines 38-55). Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention was made to have the heat absorbing and heat storing body of Baltazar include a honey comb-patterned sheet-metal, which can be arranged into a frame and includes a thermal break as taught by Anderberg to arrange the pipes in a predetermined configuration, while protecting the pipes from possible fire hazards.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Twaites et al. discloses fire-protective cellular service ducting (US 4,093,818).

Feldman discloses a thermal protective system (US 4,493,945).

Milner discloses intumescent material (US 4,945,015).

Blake et al. discloses intumescent fireproofing panel system (US 5,404,687).

Jaques et al. discloses a fire barrier ventilation system (US 5,811,731).

Dendixen et al. discloses a construction module having a fire retardant agent (US 6,061,993).

Mann discloses a fire resistant air transfer grille or damper (US 6,752,714).

Dykhoff discloses a fire stop article (US 7,018,699).

Radke et al. disclose a pass-trough firestop device (US 7,080,486).

Dykhoff disclose a rack for supporting firestop material (US 2002/0178664 A1).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jessie Fonseca whose telephone number is (571)272-7195. The examiner can normally be reached on M-F 8:30am-5:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Lanna Mai can be reached on (571)272-6867. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

JF JF
3/14/07

LANNA MAI
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 3600

